SAN DIEGO REGIONAL WATER QUALITY CONTROL BOARD

EXECUTIVE OFFICER'S REPORT

November 10, 2004

PART A
SAN DIEGO REGION STAFF ACTIVITIES *(Staff Contact)*

1. U.S. EPA Beaches Conference *(Jeremy Haas)*

On October 13-15, 2004 Christina Arias, Chiara Clemente, Sabine Knedlik, and Jeremy Haas attended the annual U.S. EPA National Beaches Conference in San Diego. The conference was designed to help state and local beach managers and public health officials share information on implementing a successful recreational beach program. The conference included presentations and panel discussions including people from EPA Headquarters, EPA Regions, state and local governments, research institutions, and environmental groups. The four major topic areas were beach monitoring and modeling, research reports, nonpoint source pollution, and communication.

Many presentations addressed shortcomings of the current health advisory system, which measures indicators of pathogens one day and posts warning/closure notices the following day. The use of traditional indicator criteria was also challenged because of the long time for laboratory measurements, inconsistent epidemiological results, and concerns about the ability of indicator bacteria to potentially persist in the environment longer than water-borne pathogens. Additional information is being sought about the health risk from non-human bacteria sources and from regrowth of bacteria within the storm drain system and environment.

Presenters discussed several avenues of research for trying to improve the accountability of indicator tests for public health noticing and for water quality regulation compliance. U.S. EPA is addressing some of the shortcomings through implementation of the Beaches Environmental Assessment and Coastal Health Act of 2000 (Beaches Act), which requires EPA to develop new criteria for indicators. EPA reported that revised freshwater criteria is scheduled for October 2005, and revised marine indicators would be developed afterwards. EPA is planning a workshop on numerical criteria this winter. The Beaches Act does provide funding for development of rapid indicator tests, and several presenters were optimistic that rapid indicator tests (about 2-4 hours) will be available within five years.

The presentations from the National Beaches Conference will be available online soon at http://www.epa.gov/beaches. In addition, EPA will be publishing a proceedings document from the conference, which is expected to be available in January 2005.

2. Mt. Carmel High School Urban Runoff and San Diego Bay Sampling Plans *(Craig Carlisle)*
On October 27, 2004 Craig Carlisle, RWQCB and Hiram Sarabia, San Diego BayKeeper met with an Advanced Placement Environmental Studies class to assist with the development of their plans to periodically sample urban runoff in Penasquitos Canyon and Poway Creeks, and to sample San Diego Bay in the vicinity of the sea bass pens near Grape Street. The high school class projects, led by instructor Harold Dorr, will continue to receive ongoing technical support from the RWQCB and San Diego BayKeeper through May 2004.

3. Public Outreach – County Department of Environmental Health – SAM Forum *(John Odermatt and Julie Chan) (Attachment A-3)*
On September 22, 2004, Regional Board staff attended the annual Site Assessment and Mitigation (SAM) Forum convened by the County of San Diego Department of Environmental Health. Attendees and participants in the SAM Forum include consultants, dischargers, and local regulatory agencies that commonly oversee the investigation and cleanup of contaminated sites. The Regional Board staff participated in the following agenda items for the SAM Forum:

- Julie Chan co-authored a presentation concerning risk-based leaking underground storage tank case closures and using site data to estimate realistic time to achieve compliance with water quality objectives.

- John Odermatt provided the agency update for the Regional Board, including current information on recent management changes to our Underground Storage Tank Program and a summary of the activity by the UST Cleanup Fund during FY03-04.

Attendees also included Ms. Erin Ragazzi (State Water Resources Control Board) who spoke about enhanced leak detection testing at operating underground storage tanks, and two representatives from the State of Florida. Attachment A-3 for this item contains the agenda for the Fall SAM Forum held on September 22, 2004.

4. Total Maximum Daily Loading (TMDL) Training *(Benjamin Tobler)*
On October 28-29, 2004 Tom Alo, Christina Arias, Craig Carlisle, Julie Chan, Lesley Dobalian, Sabine Knedlik, Alan Monji, Jimmy Smith, Benjamin Tobler, David Gibson, Brian Kelley and Stacey Baczkowski attended TMDL training in San Diego. The conference was sponsored by the California Water Board Training Academy, the California Water Quality Program, and University of California Davis Extension. It was designed to educate State Water Resource Control Board (SWRCB) and Regional Water Quality Control Board (RWQCB) staff and to facilitate sharing of lessons learned in creating and implementing successful TMDL projects.

The conference included presentations and panel discussions involving all nine Regions, as well as representatives from the State Board Water Quality Division, and Office of Chief Counsel. The three major topic areas were (1) Various Approaches to TMDL Development, (2) TMDL Legal Issues and (3) TMDL Implementation Strategies via

Nonpoint Source Controls, Storm Water NPDES Permits, Wastewater NPDES Permits, and Waste Discharge Requirements. Breakout sessions allowed staff to share knowledge and experience gained with recent accomplishments and to brainstorm possible solutions for existing and emerging challenges. The conference ended with an interactive dialogue where staff focused on strategies for improving the overall TMDL Program.

PART B
SIGNIFICANT REGIONAL WATER QUALITY ISSUES

1. Sanitary Sewer Overflows (SSO) *(Charles Cheng, David Hanson, Bryan Ott, Victor Vasquez) (Attachment B-1)*

From October 1 to October 31, 2004, there were 34 sanitary sewer overflows (SSOs) from publicly-owned collection systems reported to the Regional Board office; 23 of these spills reached surface waters or storm drains of which six resulted in closure of recreational waters. Of the total number of overflows from public systems, 12 were 1,000 gallons or more.

Nineteen sewage overflows from private property in October were also reported; one of these overflows was 1,000 gallons or more; four reached surface waters or storm drains; and one resulted in closure of recreational waters.

The combined total volume of reported sewage from all publicly-owned collection systems for the month of October was 109,188 gallons. Note that the City of San Diego Point Loma Wastewater Treatment Plant spill that occurred on October 27, 2004 is not included in this amount because it is considered a plant spill and not a collection system spill (See description of this spill below for more information).

The total rainfall recorded at San Diego's Lindbergh Field in October 2004 was 4.98 inches. It should be noted that October 2004 was the wettest on record with 4.54 inches of rainfall above normal (0.44 inches of rainfall). For comparison, in September 2004, trace rainfall was recorded, and 23 public SSOs were reported. Also for comparison, in October 2003, trace rainfall was recorded and 23 public SSOs were reported.

Attached is a table entitled "Sanitary Sewer Overflow Statistics," updated through October 31, 2004, which contains a summary of all sanitary sewer overflows (by FY) from each agency since FY 2001-2002. The data clearly indicates an overall downward trend each year in the number of SSOs from FY 2001-2002 through FY 2003-2004. Spills per 100 miles of pipeline for the agencies in the region also experienced a downward trend from FY 2001-2002 through FY 2003-2004. Also, based on the number of spills so far for FY 2004-2005 (92), the projected number for the entire FY would be 276, which is comparable to the numbers for FY 2003-2004 (275). While the number of monthly spills reported appear independent of monthly rainfall totals, some sewering agencies continue to have significant infiltration and inflow problems during severe rainfall events, such as the storms of October 2004.

It should be noted that the data for spill volume per volume conveyed can be easily misinterpreted for a sewer agency that has a small system size but experiences a spill of a few hundred gallons or more. The converse is also true for a sewer agency that has a large system. Hence, these numbers by themselves are not sufficiently representative of the measures being taken by a sewer agency to prevent SSOs, nor can the numbers be compared directly between agencies. The data does represent a different way to review and analyze SSO volume data as it relates to system size.

From FY 2001-2002 through October of FY 2004-2005, there occurred a total of 356 SSOs from private property. The data is not wholly representative of the true number and volume of private SSOs due to the fact that not every sewer agency has reported private SSOs (either a partial amount or none at all), and not all reported private spills have been recorded by the Regional Board during this time period. The Regional Board will continue to monitor the private SSOs that are reported and take any enforcement actions as appropriate against responsible parties. The Regional Board continues to work with the sewering agencies to report and to prevent sewer spills from private property.

For additional information on SSO's in FY 2003-2004 see the table entitled "Public SSO Statistics Summary for FY 2003-2004 (July 1-June 30)" attached to the October 2004 Executive Officer's Report (also available on the Regional Board's website www.swrcb.ca.gov/rwqcb9).

Issuance of Notice of Violation (NOV)

No Notice of Violations (NOVs) have yet been issued for SSOs occurring during the month of October 2004; however three significant SSOs did occur and have pending NOVs:

City of San Diego

- On October 27, 2004 an estimated 2.26 million gallon spill of untreated sewage at the Point Loma Wastewater Treatment Plant was reported to the Regional Board. High wastewater flow combined with excessive debris overwhelmed the mechanical rakes on the bar screens at the headworks of the plant. According to the City, the instantaneous flow at the time of the spill was approximately 428 million gallons per day (mgd). Peak flow capacity of the plant is well above the plant's average daily flow of approximately 180 mgd. The City has speculated that stormwater infiltrated the system through an uncapped manhole in a neighborhood or canyon. Signs warning of sewage-contaminated water were posted at access points to the ocean shoreline between Dog Beach in Ocean Beach and the Point Loma Lighthouse.

- On October 27, 2004 an estimated 10,000-gallon sewage spill to Rose Creek near I-805 was reported to the Regional Board. The cause of the spill was infiltration of runoff from MCAS Miramar that overwhelmed a City sewer main. As usual during rain events, the City was operating a temporary bypass pump to divert a portion of the flow to a separate trunk line to avoid sewage spills during peak flows. However, the

flows were too high for the bypass pump. Rose Creek flows into the north-east side of Mission Bay. Signs warning of sewage-contaminated water were posted at water contact areas in east Mission Bay. In the last 18 months, there has been efforts by MCAS to reduce stormwater flows into the sanitary system that was recently over overwhelmed. Obviously more work is needed by MCAS to reduce the stormwater flows to the City of San Diego's sewer system.

City of Encinitas / San Elijo Joint Powers Authority

- On October 28, 2004, the San Elijo Joint Powers Authority (SEJPA) reported an estimated 43,700-gallon sewage spill from the Olivenhain pump station near the I-5 freeway at Manchester Avenue. The cause of spill was attributed to a pump station failure, specifically clogged pumps and an alarm communication failure. The overflow reached San Elijo Lagoon, which drains to the Pacific Ocean. Signs warning of sewage-contaminated water were posted. The City of Encinitas owns the pump station, but the SEJPA is responsible for its maintenance and daily operations. Unlike the City Encinitas, the SEJPA is not covered under Order No. 96-04. The NOV will be issued to the City of Encinitas.

2. Clean Water Act Section 401 Water Quality Certification Actions Taken in October 2004 *(Stacey Baczkowski) (Attachment B-2)*

Section 401 of the Clean Water Act requires that any person applying for a federal permit or license which may result in a discharge of pollutants into waters of the United States, must obtain a state water quality certification that the activity complies with all applicable water quality standards, limitations, and restrictions. The majority of project applications are submitted because the applicant is also applying for a section 404 permit from the Army Corps of Engineers, and propose filling or armoring of creeks and streams. See attached table.

Public notification of pending 401 Water Quality Certification applications can be found on our web site at: http://www.waterboards.ca.gov/sandiego/programs/401cert.html.

3. Grants Update *(David Gibson)*

2003 Consolidated Grants Program Update

The Regional Board is finalizing grant agreements for the few remaining Consolidated Grants program projects. Grant agreements for all but one project should be complete by November 2004. On October 21, 2004, the State Board adopted a resolution authorizing funding for the Rainbow Creek Nutrient TMDL Implementation project recommended for federal Clean Water Act Section 319 funding.

Status of Phase I and Phase II Proposition 13 Grant Funded Projects

The two projects that were previously behind schedule are making progress toward returning to schedule. The City of San Diego Los Penasquitos Watershed Management Plan and the Orange County Munger Storm Drain project are nearly up to date on past-

due submittals. Most of the other projects funded by Proposition 13 Phase I and II are on track, even ahead of schedule, but the Regional Board has identified and is continuing to work with several grantees whose projects are falling behind schedule.

Agricultural Water Quality Grant Program (AWQGP) and Federal Clean Water Act Section 319 Nonpoint Source Implementation Grant Program (Section 319)
The SWRCB is currently accepting applications for the AWQGP and Section 319 grant programs. The deadline for submittal of the proposals is 5:00pm November 10, 2004. Applications for both grant programs must be submitted electronically in accordance with the Solicitation Notice and grant program guidelines posted on the SWRCB website at http://www.swrcb.ca.gov/funding/awqgp/index.html . The AWQGP grant program, funded by Propositions 40 and 50, provides $40.9 million statewide for projects that define, reduce, or eliminate the discharge of agricultural pollutants from irrigated lands. The Section 319 grant program provides approximately $5.5 million statewide for projects that reduce nonpoint source pollution. In the current funding cycle, the Section 319 program will give priority to projects that address agricultural pollutants from irrigated lands, but projects that address other categories of nonpoint source pollution will also be considered.

Proposition 50 Integrated Regional Water Management (IRWM) Grant Program
The IRWM grant program is funded by Proposition 50 and administered jointly by the Department of Water Resources (DWR) and SWRCB. The program will provide $380 million in two funding cycles for projects that protect communities from drought, protect and improve water quality, and improve local water security by reducing dependence on imported water. The first funding cycle will make $160 million available, $10 million for planning projects and $150 million for implementation projects.

The IRWM grant program has stringent eligibility criteria that limit funding to regional water management efforts. Eligibility criteria and details of the application process are described in the draft IRWM grant program guidelines posted at http://www.swrcb.ca.gov/funding/irwmgp/index.html. The period for public comment on these draft guidelines ended September 30, 2004. The latest draft IRWM guidelines and Proposal Solicitation Package (PSP), which were revised based on comments received by the SWRCB and DWR, were posted on the above website on October 25, 2004. Final comments on the draft guidelines and PSP are due by 5:00pm November 3, 2004. The SWRCB will hold a workshop on the guidelines and PSP on November 4, 2004 and will consider adoption of these documents on November 18, 2004. Planning Grant proposals will be due in January 2005 and Implementation Grant proposals will be due in February 2005. Application workshops will be held in November 2004 to assist applicants preparing proposals.

Water Recycling Funding Program (WRFP)
The WRFP, funded primarily by Proposition 50, will provide approximately $42M statewide in this current funding cycle for the planning, design, and construction of water recycling projects. The SWRCB adopted the Water Recycling Guidelines on October 21,

2004. The guidelines are posted at http://www.swrcb.ca.gov/recycling/draftguidelines/index.html. The next step is the development of the Competitive Project List (CPL). Interested parties will be asked to complete expanded questionnaires or update previously submitted questionnaires through the web-based Financial Assistance Application Submittal Tool (FAAST) located at: http://central/oit/faast/index.html. The SWRCB expects to adopt a draft Competitive Project List in January 2005.

Small Community Wastewater Grant Program (SCWG)
The SWRCB adopted the Competitive Project List (CPL) on October 21, 2004. Letters will be sent to all agencies in the fundable portion of the list notifying them of their ranking and the need to proceed expeditiously. Only one project, from the Anza Facilities District, was submitted from the San Diego Region. Information on this grant program can be found at http://www.swrcb.ca.gov/cwphome/scwg/index.html.

State Revolving Fund Loan Program
The SWRCB will soon announce that the State Revolving Fund (SRF) program has resumed accepting and processing application for SRF loans. This effort is in anticipation of funding being available for new loans around May 2005, after the completion of a revenue bond sale.

4. San Diego Municipal Storm Water Permit Re-issuance *(Phil Hammer) (Attachment B-4)*
On October 22, 2004, the Regional Board met with representatives of the Copermittees to discuss the re-issuance process for the San Diego Municipal Storm Water Permit (Permit), which is tentatively scheduled for re-issuance in February 2006. At the meeting, the Regional Board discussed its expectations regarding the information to be included in the Report of Waste Discharge. The Report of Waste Discharge serves as the Copermittees' application for re-issuance of the Permit, to be used by the Regional Board during the redrafting of the Permit. The Regional Board also described how it envisions the re-issuance process to proceed, including a series of meetings to be held between the Regional Board and the Copermittees to discuss proposed changes to the Copermittees' implementation of their storm water programs. From the October 22, 2004 meeting, it appeared that the Regional Board and the Copermittees were in general agreement on the type of information to be included in the Report of Waste Discharge and the general process to be followed for permit re-issuance. A letter to the Copermittees outlining the Regional Board's position on the Report of Waste Discharge and permit re-issuance process is attached (Attachment 1). Following the initial meetings with the Copermittees, the Regional Board plans to conduct workshops to provide the opportunity for input on the Permit from all stakeholders.

5. 14-Mile Border Infrastructure System *(Phil Hammer)*
As previously reported, the Regional Board has received an application for 401 Water Quality Certification from the U.S. Border Patrol for the 14-Mile Border Infrastructure System, which is essentially a 14-mile long fencing structure along the U.S./Mexican

Border. A 401 Water Quality Certification is required when a project proposes to discharge fill material to waters of the U.S. The Border Infrastructure System project crosses numerous watercourses and wetlands, and proposes to fill approximately 10 acres of waters of the U.S., including riparian areas and coastal salt marsh.

To expedite completion of the Border Infrastructure System, an amendment was added to the "9/11 Recommendations Implementation Act" (H.R. 10), which is currently pending federal legislation. This legislation, as amended, would exempt the Border Infrastructure System from 16 federal environmental laws, including the Clean Water Act. H.R. 10 passed the House of Representatives on October 8, 2004. The legislation is currently in Senate conference committee.

If H.R. 10 becomes law, the Border Infrastructure System will be exempt from the requirements of the Clean Water Act. In such a case, a 401 Water Quality Certification for the project would not be required. However, state requirements under the Porter-Cologne Water Quality Control Act would still apply to the project. Under Porter-Cologne, the Regional Board can require the Border Infrastructure System to apply for waste discharge requirements for the project's proposed discharge of waste to waters of the state.

6. Pioneer Builders, Inc., Completes Payments of Administrative Civil Liability Status of Compliance with Cleanup and Abatement Order No 2003-158 *(Rebecca Stewart)*
On October 28, 2004 Pioneer Builders (now known as Castillo del Mar Development, Inc.) submitted its final payment of $18,437.50 to fully remit the $73,750 liability assessed by the Regional Board in ACL Order No. R9-2003-0301 (adopted in November 2003). With this final payment, no further action is necessary on the ACL order.

In regards to the status of compliance with Cleanup and Abatement Order No. R9-2003-0158 (as amended on June 11, 2004), Castillo del Mar Development, Inc. has until March 2005 to complete off-site mitigation consisting of restoration/enhancement work at North Creek at Doheny State Beach. We will update the Regional Board with any new information.

7. Proposed Gregory Canyon Landfill *(John Odermatt)*
Copies of all recent (from 2000 to 2004) staff letters are available on this Regional Board's web page at:

http://www.waterboards.ca.gov/sandiego/units/ldu/gregory_canyon.html

As of November 3, 2004, the County Registrar of Voters web site reports that the voters did not approve Proposition B on November 2, 2004. The Regional Board staff anticipates that GCL will submit a revised Joint Technical Document (JTD) later this month.

8. Mission Valley Terminal Cleanup – Status/Update (*Kelly Dorsey and John Odermatt)*

On May 3, 2004, the Regional Board held a Workshop to collect public comments on the Final Summary Report that was submitted by Kinder Morgan earlier this year. Since that time, Kinder Morgan has expanded the Mission Valley Terminal (MVT) remediation system at the active Terminal Site and in the "off-property area" of groundwater pollution, including significant portions of the parking lot at Qualcomm Stadium. Kinder Morgan has installed additional soil vapor extraction wells and a groundwater extraction system within their property boundary ("on-property area"). Two main functional objectives of the operating groundwater extraction system include:

- Containment of the existing groundwater pollution within the Kinder Morgan property boundary, and

- To expose more of the gasoline in the soil, located within the off-property area, for cleanup and recovery using the soil vapor extraction system.

The on-property ground water extraction system is planned to be fully operational by the end of January 2005.

The Regional Board staff and our technical consultants (Drs. Eggers and Johnson) are currently developing milestones and compliance dates for cleanup and abatement of groundwater pollution. The milestones and cleanup dates will be presented to the Regional Board as a tentative addendum to Cleanup and Abatement Order No. 92-01. The tentative addendum will propose cleanup milestones and compliance dates for the off- property groundwater pollution, a monitoring and reporting program to assess the status of groundwater pollution, and contingency plans to ensure that adequate progress is being made to achieve the cleanup dates. Limited availability of staff resources has made it necessary to postpone the preparation of the tentative Order and scheduling of the agenda item for consideration by the Regional Board. Depending upon the availability of resources, the staff anticipates that consideration of the tentative addendum to CAO 92-01 will be added to the Regional Board's agenda for either February or March 2005.

On November 1, 2004, the Regional Board staff met with Kinder Morgan and the City of San Diego to discuss their views of a joint technical approach to the required cleanup of pollution from the MVT site. The Regional Board staff plans to participate in monthly MVT cleanup progress meetings with representatives from Kinder Morgan.

9. Budget Trade and Gas – Status/Update (*Susan Pease and John Odermatt*)
Since the April 14, 2004 Executive Officer's Report, the following events have occurred:

- On June 2, 2004, the results of all three 15-day High Vacuum Dual Phase Extraction (HVDPE) System treatment events were submitted to the Regional Board with a

proposal to include air sparging with additional HVDPE treatments. However, the proposal did not include a time schedule.

- On June 21, 2004, the Regional Board issued Addendum No. 8 to Cleanup and Abatement Order (CAO) No. R9-2000-255. Addendum No. 8 requires that an amendment to the Corrective Action Plan (including a project schedule) be submitted by August 9, 2004. Unfortunately, the consultant had already sent the Regional Board an amended workplan on the same day without seeing the Addendum to the CAO.

- On July 12, 2004, the Regional Board staff sent a letter containing comments on the amended workplan. It was determined that two additional items were needed - a description of site-specific conditions that would be used as the criteria to justify a switch from active remediation to natural attenuation, and a time schedule.

- On August 5, 2004, Mr. Hsu provided the Regional Board with a revised workplan for site remediation. The revised workplan contains anticipated contaminant levels after four 30-day HVDPE events, and calculated natural attenuation period necessary to achieve the applicable water quality objectives. A proposed time schedule was also included in the amended workplan. It was determined that the revised workplan contains the essential elements of the Corrective Action Plan required in Addendum No. 8 to CAO R9-2000-255. A letter notifying Mr. Hsu of this determination was sent on August 23, 2004.

- On August 30, 2004, the CalClean High Vacuum Dual Phase Extraction (HVDPE) mobile unit was brought to Budget Trade & Gas to begin 30-day treatment of soil and groundwater. A subsequent site inspection on September 1, 2004 verified that CalClean mobile unit was on-site. The gas station upgrades were completed and the gas station was operational

- On August 30, 2004 a Regional Board staff letter was sent to Mr. Hsu requesting a proposed schedule for completing the health risk assessment and technical report as required by Addendum No. 7 to CAO No. 2000-255. On September 15, 2004, Mr. Hsu submitted a proposed time schedule for completion of health risk assessment and technical report (July 31, 2005) based on four 30-day remediation periods with 30-day rest between.

- On September 22, 2004, the USTCF sent the consultant and email regarding a reimbursement request for remediation by HVDPE. The USTCF requested a cost analysis of fixed unit versus mobile unit, and recommends that the Responsible Party (Mr. Hsu) seek cost pre-approval of all upcoming corrective action cost. On September 23, 2004, the consultant emailed the USTCF that all future 30-day HVDPE events are on hold until the consultant completes and submits a cost comparison per the request by the USTCF.

10. Results of Mission Bay Bacterial Source Identification and Epidemiology Study (*Sabine Knedlik) (Attachment B-10)*

Mission Bay, an enclosed bay within the City of San Diego, does not meet applicable water quality objectives for bacteria indicators. The entire shoreline of Mission Bay was designated by the Regional Board as a "Water Quality Limited Segment" for bacteria indicators in 2002, and given a high priority ranking on the list of impaired water bodies for development of a Total Maximum Daily Load pursuant to Clean Water Act section 303(d). Historically, high bacteria counts were attributed to sanitary sewer spills and other sources that transport bacteria through the storm water conveyance system. In the last three years, two separate dry-weather studies were conducted in Mission Bay to identify the source of the bacteria and to evaluate the potential of developing illnesses due to water contact recreation in Mission Bay.

Mission Bay Source Identification Study:

Between 2002 and 2003, the City of San Diego, in conjunction with MEC Analytical Systems-Weston Solutions Inc., conducted a study to assess the enteric bacterial contamination in Mission Bay, to investigate any major potential sources of bacteria to Mission Bay, and to identify the host origin (human, avian, etc.) of the bacteria in the bay.

The study concluded that the majority of enteric bacteria originated from birds. Using a MST method (Ribotyping), the majority of bacteria were found to come from avian hosts (~67 percent), while canines (~9 percent), marine and other mammals (~9 percent), and humans (~5 percent), contributed the remainder. The percentage of unknowns in the samples ranged from 1 to 29 percent. Additionally, the study found that the initial bacteria loads, generated mostly by birds, were amplified by processes related to the wrack line (algae, kelp, etc, accumulating on high tide line), irrigation runoff from grassy areas, intertidal sediment re-suspension, and tidally influenced storm drains. These amplifying processes increased the bacteria loads in Mission Bay. Leaking restroom infrastructures, illegal discharges of sewage from moored and anchored boats, the homeless population, and bacteria transport via groundwater and sediment were not found to be sources of bacteria to Mission Bay.

The source identification study took place during dry weather conditions. Other bacteria sources, like sewage spills and storm drain runoff, may contribute significant bacteria loads during storm events. An electronic copy of the study can be obtained from Ms. Knedlik.

Mission Bay Epidemiology Study:

During the summer of 2003, the Southern California Coastal Water Research Program and the University of California, Berkeley, conducted a study on Mission Bay beach goers to investigate if water contact in Mission Bay would affect the risk of developing illness. Over 8,500 beachgoers participated in the study. During the course of the study, water samples were taken throughout the day and analyzed for the traditional indicators (fecal

and total coliform, Enterococcus, and *E. coli*), as well as for relatively new indicators like coliphage.

The preliminary study results indicate that swimmers in Mission Bay are unlikely to develop illnesses due to water contact recreation. The overall illness rate for the study was low with less than 5 percent of swimmers developing minor illnesses, such as diarrhea and skin rashes. This illness rate for swimmers was not significantly higher than the rate for non-swimmers once the data were adjusted for factors such as age and gender. A slightly elevated risk (compared to non-swimmers) of developing diarrhea was found among swimmers in the 5 to 12 year old age group while people less than 30 years of age showed a slightly higher risk for developing skin rashes. The study found no link between the occurrence of illness and density of bacteria indicators. As with the source identification study, the epidemiological study took place during dry weather conditions.

The results of the *Mission Bay Epidemiology Study* were presented for the first time at the U.S. EPA National Beaches Conference in San Diego on October 14, 2004. The study report will not be available until January 2005. The San Diego Union Tribune published two articles on the two Mission Bay studies. Copies of the newspaper articles are attached.

11. Comment Period Opened on Revised Draft TMDL Report for Shelter Island Yacht Basin TMDL for Dissolved Copper (*Lesley Dobalian*)

The Revised Draft Resolution, Basin Plan Amendment, and Technical Report for the Shelter Island Yacht Basin TMDL for Dissolved Copper (revised Draft TMDL Report) were released for a second public review and comment period. Following the first comment period the Regional Board revised certain sections of the Draft TMDL Report and is accepting public comments on these revisions until 5 p.m. on November 12, 2004. Barring further substantial changes to the revised Draft TMDL Report, the TMDL Basin Plan amendment will be brought before the Regional Board for adoption on December 8, 2004. The revised Draft TMDL Report can be accessed from our website homepage under "Water News."

Shelter Island Yacht Basin (SIYB) is a densely populated recreational marina located in San Diego Bay. Levels of dissolved copper in SIYB exceed numeric water quality objectives for copper and narrative water quality objectives for toxicity and pesticides, and threaten and impair the wildlife habitat and marine habitat beneficial uses in SIYB. Subsequently, SIYB was placed on the List of Impaired Water Bodies and a TMDL was developed to address and resolve the impairments.

Approximately 97 percent of copper loading to SIYB comes from copper antifouling paints applied to recreational vessels moored in the marina. Dischargers of copper to SIYB include the San Diego Unified Port District, SIYB marina owners/operators, persons owning boats moored in SIYB, and underwater hull cleaners operating in SIYB. To a much lesser extent, the City also discharges copper from its MS4s. Dischargers are accountable for achieving compliance with the copper reductions specified in the TMDL.

Portions of the section entitled "Legal Analysis" are deleted in the revised Draft TMDL Report and the section entitled "Implementation Plan" was rewritten in response to comments that the passive leaching of copper from boat hulls is not a point source, and should not be regulated under waste discharge requirements that implement NPDES regulations. Although there are plausible arguments that the discharge of copper from boat hulls is from a point source, to develop and apply appropriate numeric effluent limits and other conditions needed for NPDES requirements would be complex and controversial. The Regional Board's authority to implement the TMDL is not affected by the deletion of the legal analysis. The arguments for and against regulating passive leaching under NPDES requirements may need to be addressed as the Regional Board pursues implementation

The draft Basin Plan Amendment was modified to include a method to recalculate the TMDL, Margin of Safety (MOS), and allocations if the water quality objectives for dissolved copper in SIYB are changed in the future. Lastly, in the section entitled "Environmental Review" the response to the California Environmental Quality Assessment (CEQA) checklist question, "would the project violate any air quality standard or contribute substantially to an existing or projected air quality violation" was changed from "less than significant" to "potentially significant unless mitigation is incorporated."

12. Regional Harbor Monitoring Program Status *(Pete Michael)*
A work plan for the proposed monitoring program has been submitted for the five harbors in the San Diego Region: Dana Point, Camp Pendleton, Oceanside, Mission Bay, and San Diego Bay. The coordinated program would be a long-term and comprehensive look into how well water quality supports beneficial uses.

The Port of San Diego, City of San Diego, City of Oceanside, and County of Orange jointly submitted the work plan and intend to sample beginning July 1, 2005 in coordination with the marina copper sampling program being funded through the Surface Water Ambient Monitoring Program (SWAMP). The Southern California Coastal Water Research Project (SCCWRP) will carry out the copper program. As data and reports become available the Regional Board and agencies will be able to prioritize water quality work and measure how well beneficial uses are supported.

The harbor monitoring agencies will schedule a pilot program to be carried out in two phases: Phase I will run through June 30, 2005 and will involve literature review, mapping, lab and field quality assurance, and database creation. Phase II will run through June 30, 2008 and will involve sampling and refinement of the study design. The Regional Board is searching for funding to assist in performing this work.

13. Rainbow Creek TMDL *(Alan Monji and Benjamin Tobler)*
Rainbow Creek is listed on the 2002 Clean Water Act Section 303(d) list as an impaired water body due to excessive nitrogen and phosphorus concentrations. The Clean Water

Act provides that the Regional Board must establish Total Maximum Daily Loads (TMDLs) for nitrogen and phosphorus designed to attain the applicable water quality objectives for biostimulatory substances. The TMDLs will be implemented in a phased approach over the next 16 years in order to meet the goal of reducing the total nitrogen and total phosphorus loads to the creek, achieving water quality objectives, and restoring beneficial uses.

The Rainbow Creek TMDL was brought before the Regional Board in a public hearing on May 8, 2002. Due to concerns expressed by the Board members and comments received from the public, the TMDL was not adopted. Two of the issues were the 303(d) listing and the background sources. Since the May 8, 2002 hearing, the TMDL document has gone through extensive revisions that addresses the concerns expressed by the Board members and public. The Rainbow Creek 303(d) listing prior to 2002 was for eutrophic conditions and did not specify nitrogen and phosphorus. Therefore, for clarification, the 2002 303(d) list identified nitrogen and phosphorus as the pollutants. Regarding background sources, the revised TMDL document uses water quality data from several San Diego County streams to more accurately calculate background nitrogen and phosphorus loading.

The revised TMDL document recently went through a second scientific peer review and was posted on the Regional Board's website on October 22, 2004 for public review and comment. A public hearing notice was posted on the Regional Board's website on October 8, 2004 and sent out to interested parties on October 14, 2004. A public workshop is scheduled for November 17, 2004 and a public hearing for December 8, 2004.

14. San Marcos Highlands *(Christopher Means)*

During the public forum at the October 2004 Board meeting, Sandra Farrell representing the group Friends of Hedionda Creek requested a public hearing by the Regional Board prior to the issuance of a Water Quality Section 401 Certification for the San Marcos Highlands Residential Development. San Marcos Highlands is a proposed 213- lot residential development on 200 acres located on the northeast boundary of the City of San Marcos with the County of San Diego. The site is bisected north to south by the headwaters of Agua Hedionda Creek.

The original 401 application for the proposed project was received on December 23, 2002. Since that time the project has undergone revisions. As a result of a January 21, 2004 meeting between the developers and all the regulatory agencies (including the Regional Board) an updated permit application package was received on June 10, 2004, which addressed many of the various regulatory agency concerns. The Regional Board attended another all-agency meeting on October 6, 2004 to discuss the updated permit package, and have also met individually with the project proponents to discuss the post construction treatment BMP's proposed for the development.

At this time, the project proponent must still submit requested supplemental information to the Regional Board prior to preparing a draft 401 certification. The outstanding information relates to the function of a water quality basin on site and the feasibility of implementing a bridged stream crossing over Agua Hedionda Creek at Street A.

Subsequent to the public forum, a meeting was arranged for November 12, 2004, to meet with Ms. Farrell, and other members of the Friends of Hedionda Creek to discuss their concerns with the San Marcos Highlands project.

15. AB 885 Regulations – Onsite Wastewater Treatment Systems *(Bob Morris)*
As enacted by Assembly Bill 885 and prescribed by California Water Code section 13291, the State Water Resources Control Board is currently drafting new statewide regulations for the permitting and operation of onsite wastewater treatment systems (OWTS). An OWTS is any individual or community onsite wastewater treatment, pretreatment, and dispersal system. The most common OWTS in the San Diego Region is the "conventional" septic tank/leach field system. There are also a few systems referred to as "alternative systems" such as mounds and evaporation/transpiration systems. In addition, the SDRWQCB recently has received several proposals for onsite systems referred to as "experimental systems". These systems, which are designed to reduce pathogen and nitrate levels in the discharge, consist of small treatment plants with shallow subsurface drip irrigation systems on individual homesites and commercial lots.

This past summer, the State Board staff released to the regional boards a draft copy of the proposed regulations for our internal review. After receiving numerous comments from several regions, the State Board staff concluded that the document needed to be revised before being released to the public. Our issues regarding the internal draft were discussed in the August 2004 Executive Officer's Report.

A revised draft with its supporting environmental documents is expected to be released to the public in early 2005. No tentative date has been set for the State Board to consider this item, but indications are that it would not be until the end of 2005 at the earliest. The Regional Board and the County Department of Environmental Health will continue to coordinate our tracking and review of these new regulations.

PART C
STATEWIDE ISSUES OF IMPORTANCE TO THE SAN DIEGO REGION

1. *Caulerpa taxifolia* Eradication and Prevention Activities *(Lesley Dobalian, Chiara Clemente & Bruce Posthumus)*

The summer 2004 surveys of Agua Hedionda Lagoon (AHL) and Huntington Harbour (HH) for the invasive non-native seaweed *Caulerpa taxifolia* have been completed. No *C. taxifolia* was found at either site. The fall 2004 surveys are now underway. *C. taxifolia* has not been detected in AHL since September 2002 or in HH since November 2002. Due to inherent limitations in the efficacy of surveys, it is not possible to be absolutely certain that eradication has been achieved. However, if no *C. taxifolia* is found in the fall 2004, summer 2005, or fall 2005 surveys, it is likely that the AHL and HH infestations will be considered eradicated, based on statistically high levels of confidence determined by the number of surveys conducted without finding *C. taxifolia* and estimates of survey efficacy.

The Regional Board continues to oversee a $600,000 Clean Water Act (CWA) §319(h) grant to the United States Department of Agriculture (USDA) for development of treatment methods for infestations of *C. taxifolia* in high-energy, open coastal environments.

The Regional Board will also oversee a $500,000 CWA §319(h) grant to the Agua Hedionda Lagoon Foundation (AHLF) for surveillance, treatment (if *Caulerpa* is found), and outreach/education. The contract for that grant was finalized on October 7, 2004. Surveillance, treatment, and outreach/education work is also being funded by a grant to AHLF from the Southern California Wetlands Recovery Project through the State Coastal Conservancy.

The Regional Board is working to finalize a $2.266 million Proposition 13 grant agreement with the California Department of Fish and Game (CDFG). The funding would be used for resumption of surveillance in "high risk" areas throughout southern California where *Caulerpa* infestations could be present, treatment (if an infestation is found), and outreach/education.

On September 14, 2004, AB 2072 (Wyland) was approved by the governor and chaptered by the Secretary of State. AB 2072 provides for restriction or prohibition of recreational vessel activity in AHL for one year after declaration of eradication of *C. taxifolia* in AHL if that activity would hinder or jeopardize efforts to control or eradicate *C. taxifolia*. AB 2072 supersedes AB 1059, which provided for such restrictions and prohibitions in AHL indefinitely and in waters of the state in general until January 1, 2004. AB 2073 (Wyland), which would have provided for such restrictions and prohibitions in waters of the state in general until January 2010, did not get out of committee. AB 2631 (Wolk), which would have established an Invasive Species Management Fund and created an Invasive Species Council to develop a statewide invasive species plan and make recommendations for the prevention, early detection and rapid response, and control and management of invasive species, was vetoed by the Governor.

On October 26, 2004, the Animal and Plant Health Inspection Service (APHIS) of USDA published a notice [7 CFR Part 360 Docket No. 04-037-1] announcing receipt of two petitions; the first requesting that the entire genus of *Caulerpa* be added to the federal list

of noxious weeds; the second requesting that, if the first petition is denied, all varieties of *C. taxifolia* be added to that list. Currently, only the Mediterranean strain of *C. taxifolia* is on the federal list of noxious weeds. Listed noxious weeds may not be imported into the US or transported interstate without a permit granted by APHIS. Comments are due on or before December 27, 2004. In California, AB 1334, which took effect in September 2001, prohibits the sale, possession, importation, transport, transfer, live release, or giving away of nine species of the genus *Caulerpa*, including *C. taxifolia*.

The Southern California *Caulerpa* Action Team (SCCAT) met on August 3 and October 1, 2004. SCCAT participants include representatives of Cabrillo Power, AHLF, the City of Carlsbad, and state and federal agencies. The SCCAT Steering Committee, consisting of representatives of USDA, CDFG, National Oceanic and Atmospheric Administration, Santa Ana Regional Water Quality Control Board, and San Diego Regional Water Quality Control Board, is responsible for overseeing eradication efforts and providing guidance on related work. The Regional Board continues to chair and prepare agendas and minutes for SCCAT meetings.